

Honey bee feeding

The honeybee feeds on nectar and pollen, both of which are collected from flowers

compound eye

antenna

Head of honey bee

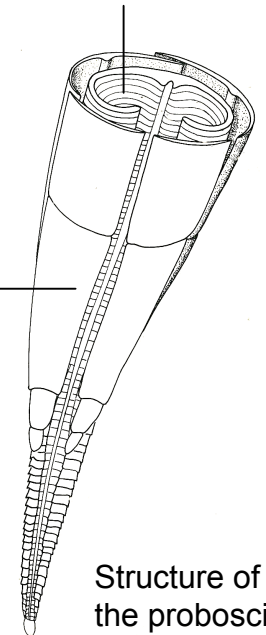
Nectar

The nectar is sucked from the nectaries in flowers by means of a proboscis. The proboscis is tucked back under the thorax when not in use

jaws; they manipulate the wax in making the cells and cut the capping off the cells

mouthparts which fit together to form a tube

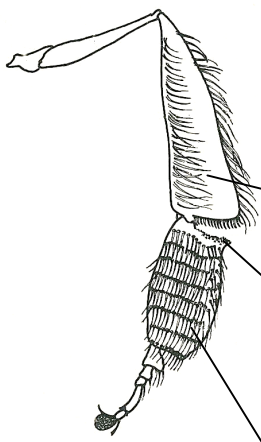
tube through which nectar is drawn



Structure of the proboscis

Pollen

When a bee visits a flower, its body becomes dusted with pollen. The hind legs are adapted to comb the pollen off the body, compact it and store it as 'pollen sacs'. These are pushed into cells in the hive when the bee returns.

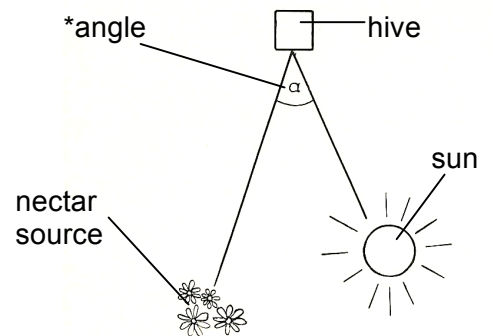


Bee's hind leg

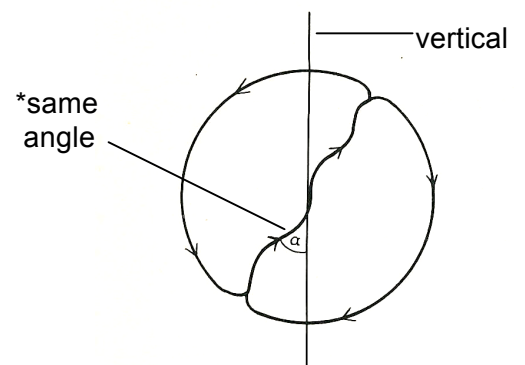
pollen pushed in between the two rows of bristles to form pollen sac

pollen press compacts the pollen

pollen comb collects pollen from body



A bee returning to the hive from a good source of nectar performs a 'dance' on the vertical comb. The dance follows a track like a squashed figure 8. The angle between the central line and the vertical represents the angle between the source, the hive and the sun. The degree of 'waggle' in this line indicates the distance; more waggle means greater distance. Other workers, in the darkness of the hive follow the dancing bee and so learn the direction and distance of the nectar source



The 'waggle-tail dance'